

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Continuation of: )  
)  
PCT/EP00/07218 ) Group Art Unit: Not assigned  
)  
Inventor: Sergio BELLI et al. ) Examiner: Not assigned  
)  
Serial No.: Not Yet Assigned )  
)  
Filed: February 8, 2002 )  
)  
For: PROCESS FOR THE  
PRODUCTION OF A CABLE AND  
DEVICE FOR PERFORMING THIS  
PROCESS

Assistant Commissioner for Patents  
Box Patent Application  
Washington, DC 20231

Sir:

**PRELIMINARY AMENDMENT**

Prior to the examination of the above-identified application as follows:

**IN THE SPECIFICATION:**

Please amend the specification as follows:

Page 1, after the title, insert the following new headings and subheading and new paragraph as follows:

**--CROSS REFERENCE TO RELATED APPLICATIONS**

This application is a continuation of international application number

PCT/EP00/07218, filed July 27, 2000, the content of which is incorporated herein by

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10057852, 05788.0208

reference, and claims the priority of European Patent Application No. 99115701.7, filed August 9, 1999, and the benefit of U.S. Provisional Application No. 60/157,021, filed October 1, 1999, the content of which is incorporated herein by reference.

### BACKGROUND OF THE INVENTION

Field of the Invention--.

Page 1, before line 21, add the following new subheading:

--Description of the Related Art--.

Page 7, before line 10, add the following new section heading:

--SUMMARY OF THE INVENTION--.

Page 10, before line 9, add the following new section heading:

--BRIEF DESCRIPTION OF THE DRAWINGS--.

Page 10, before line 24, add the following new heading:

--DETAILED DESCRIPTION OF THE INVENTION--.

### IN THE CLAIMS:

Please cancel now pending claims 1-19 without prejudice or disclaimer and substitute new claims 20-34 therefor as follows:

### WHAT IS CLAIMED IS:

20. (New) A process for the production of a cable having at least one covering layer consisting of a composition comprising at least one polymeric material and a mineral filler in a quantity greater than 30% by weight relative to the total weight of the composition, said cable being produced by using an extruder comprising a cylindrical casing, at least one extrusion screw of preset pitch positioned within said casing and having an axis of rotation parallel to the axis of said cylinder, a charging

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hopper located at a first end of said casing, a filtration section located close to the head of said screw, and positioned perpendicular to the axis of said screw, a connecting flange positioned downstream from the filtration section, and an extrusion head comprising a conveyer element and a die communicating with the exterior, so as to define a second end of said casing, said process comprising the steps of:

- a) conveying at least one conducting element inside of said extruder;
  - b) feeding the polymeric material and the mineral filler, optionally premixed with other components of said composition, into said extruder via said charging hopper;
  - c) filtering said composition transferred and plasticized by said extrusion screw; and
  - d) depositing said composition onto said at least one conducting element;
- whereby the filtration operation is performed by using a filter support plate defining a plurality of sectors within which the filtered composition flows.

21. (New) A process according to Claim 20, wherein said filter support plate is positioned downstream of said extrusion screws..

22. (New) A process according to Claim 20, wherein the filtration efficiency (E) is greater than 0.8.

23. (New) A process according to Claim 22, wherein the filtration efficiency (E) is greater than 0.9.

24. (New) A process according to Claim 20, wherein said composition has a Melt Flow Index lower than 15 g/10 min (measured as per the standard ASTM 1238, with a capillary of diameter 2 mm, using a weight of 21 kg and heating the composition to a temperature of 240°C).

25. (New) A process according to Claim 20, wherein said mineral filter quantity lies between 50% and 80% by weight relative to the total weight of the composition.

26. (New) A process according to Claim 20, wherein said mineral filler is a fire resistant filler.

27. (New) A process according to Claim 20, wherein the cable obtained at the exit from said extruder is conveyed to at least one cooling unit..

28. (New) A process according to Claim 20, wherein the cable obtained at the exit from said extruder is conveyed to at least one crosslinking unit.

29. (New) A process according to Claim 20, wherein said at least one conducting element is subjected to a constant pull by a system of pulleys, gears, or pulleys and gears.

30. (New) A process according to Claim 29, wherein the speed of said pull lies between 600 and 1500 m/min.

31. (New) A process according to Claim 20, wherein downstream from said at least one cooling unit, said cable is subjected to a drying stage.

32. (New) An apparatus for the production of a cable having at least one covering layer consisting of a composition comprising at least one polymeric material and a mineral filler in a quantity greater than 30% by weight relative to the total weight of the composition, said apparatus comprising:

at least one charging hopper for feeding the polymeric material and said mineral filler, optionally premixed together or with other components of said composition;

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at least one extruder comprising an extrusion screw and an extrusion head inside of which is contained a die for the purpose of fitting said covering layer around at least one conducting element of said cable;

at least one device for unwinding said conducting element; and

at least one device for winding said cable, wherein the filtration section of said extruder has a filter support plate defining a plurality of sectors within which the filtered composition flows.

33. (New) An apparatus according to claim 32, further comprising one or more units for cooling said cable.

34. (New) An apparatus according to claim 32, further comprising one or more units for crosslinking before said one or more cooling units.

**IN THE ABSTRACT:**

Add a new page 33 after the claims, adding the following ABSTRACT OF THE DISCLOSURE. A new separate page 33 is enclosed.

**--ABSTRACT OF THE DISCLOSURE**

A process for producing cables, in particular cables for the distribution of electrical energy or cables for telecommunications, more particularly, cables having at least one covering layer having a composition of high viscosity. Cables with at least one covering layer are made from a polymeric composition having a mineral filler capable of imparting one or more specific properties to the cables. A production process includes conveying at least one conducting element inside of an extruder; feeding the polymeric material, optionally premixed with other components of the composition, into the extruder; filtering the material transferred and plasticized by the

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screw of the extruder; and depositing the material onto the at least one conducting element, the filtration operation being performed with a filtration efficiency greater than 0.8, preferably greater than 0.9.

**REMARKS**

The claims have been amended to conform them to U.S. practice. Claims 20-34 are pending in this application. No new matter has been introduced by these amendments.

The examiner is respectfully requested to consider the above preliminary amendment prior to examination of the application.

If there is any fee due in connection with the filing of this Preliminary Amendment, please charge the fee to our Deposit Account No. 06-0916. If a fee is required for an extension of time under 37 C.F.R. § 1.136 not accounted for above, such an extension is requested and the fee should also be charged to our deposit account.

Respectfully submitted,

FINNEGAN, HENDERSON, FARABOW,  
GARRETT & DUNNER, L.L.P.

Dated: February 8, 2002

By:   
Ernest F. Chapman  
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